

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claim 1 (Currently Amended): Method for nozzle-jetting oxygen into a synthesis reactor, ~~e.g.~~ for oxy-dehydration, for largely axial flow of the gas mixture through a catalyst bed, wherein the oxygen is fed to a ring distributor system arranged above the catalyst bed in pure form, as air mixed with inert gas or water ~~vapour~~ vapor and is jetted on to the catalyst surface through several exit openings in the ring distributor at an inclined angle from the vertical.

Claim 2 (Previously Presented): Method according to claim 1, wherein the jetting of the oxygen is taken up in a direction on to the reactor center and/or in direction on to the reactor wall and/or in a tangential alignment.

Claim 3 (Previously Presented): Method according to claim 1, wherein the jetting of the oxygen takes place in tangential alignment and for each ring of the ring distributor in alternating alignment from ring to ring of the ring distributor.

Claim 4 (Previously Presented): Method according to claim 1, wherein the jetting of the oxygen takes place in a plane approximately 50-300 mm above the catalyst bed, which ensures an oxygen dwelling time of ≤ 1 second in the space above the catalyst bed.

Claim 5 (Currently Amended): Device for nozzle-jetting oxygen into a synthesis-reactor, ~~e.g.~~ for oxy-dehydration, with largely axial flow of the gas mixture through a catalyst bed, especially for conducting the method according to claim 1, wherein there is a ring distributor ~~consisting of~~ comprising several concentric ring pipes~~(7)~~ provided with exit openings ~~(6)~~ above a catalyst bed ~~(3)~~, where the exit openings ~~(6)~~ are designed for jetting the oxygen on to the catalyst surface at an angle inclined away from the vertical.

Claim 6 (Currently Amended): Device according to claim 5 with a central gas inlet pipe that centrically penetrates that catalyst bed and with a mixing dome above the catalyst bed, wherein there is an oxygen ring distributor ~~(7)~~ surrounding the centric gas guiding pipe ~~(2)~~.

Claim 7 (Currently Amended): Device according to claim 5, wherein the ring distributor is formed with several co-axially positioned ring pipes ~~(7)~~ with gas exit openings ~~(6)~~ that ensure a gas flow in the direction on to the reactor center and/or reactor wall and/or in tangential direction.

Claim 8 (Currently Amended): Device according to claim 5, wherein adjacent gas exit openings ~~(6)~~ have a different flow outlet directions.

Claim 9 (Currently Amended): Device according to claim 5, wherein the gas exit openings ~~(6)~~ are aligned in alternating sequence to adjacent exit openings of an adjacent ring pipe.

Claim 10 (Currently Amended): Device according to claim 5,
wherein the gas exit openings ~~(6)~~ are designed as holes or
nozzles.